

## ABSTRACT OF THE DISCLOSURE

**[0045]** The present invention allows remote antenna units for radio frequency signal transmission and receipt to operate without the requirement for remote electrical power supplies or for connecting cables that incorporate electrical conductors. According to an aspect of the present invention, an optical communications system employing radio frequency signals comprises a central unit; at least one remote unit having at least one optoelectronic transducer for converting optical data signals to radio frequency signals and converting radio signals to optical signals and at least one antenna to receive and send radio frequency signals; at least one optical fiber data link between the central unit and the remote unit for transmitting optical data signals therebetween; and at least one optical fiber power link between the central unit and the remote unit for providing electrical power at the remote unit.